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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/822,886	04/13/2004	David Michael Glenn	4829A(CIP)	4008

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ENGELHARD CORPORATION  
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EXAMINER

ARNOLD, ERNST V

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1616

DATE MAILED: 02/09/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

<b>Office Action Summary</b>	Application No. 10/822,886	Applicant(s) GLENN ET AL.	
	Examiner Ernst V. Arnold	Art Unit 1616	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☐ Responsive to communication(s) filed on \_\_\_\_.
- 2a) ☐ This action is **FINAL**.                      2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1-43 is/are pending in the application.  
     4a) Of the above claim(s) 12-23 is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-11 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 13 April 2004 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.  
     Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
     Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).  
     a) ☐ All    b) ☐ Some \* c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- |  |   |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892)  | 4) <input type="checkbox"/> Interview Summary (PTO-413)<br>Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)   | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152)             |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)<br>Paper No(s)/Mail Date <u>3/30/05, 8/9/04</u> | 6) <input type="checkbox"/> Other: _____  |

***Election/Restrictions***

Restriction to one of the following inventions is required under 35 U.S.C. 121:

- I. Claims 1-11, are drawn to a composition comprising a particulate material; an organic non-vegetable non-fuel high boiling oil; and at least one additive selected from the group consisting of ionic salt, colored particle or surfactant, classified in class 424, subclass 489.
- II. Claims 12-23, are drawn to a method of controlling pests, classified in class 424, subclass 405.
- III. Claims 24-35, are drawn to a composition comprising a particulate material; and at least one additive selected from the group consisting of plant producing media and salt, classified in class 514, subclass 770.
- IV. Claims 36-43, are drawn to a method of controlling pests, classified in class 504, subclass 357.

The inventions are distinct, each from the other because:

Inventions I and II are related as product and process of use. The inventions can be shown to be distinct if either or both of the following can be shown: (1) the process for using the product as claimed can be practiced with another materially different product or (2) the product as claimed can be used in a materially different process of using that product (MPEP § 806.05(h)). In the instant case the composition can be used as fertilizer.

Inventions I and III are unrelated. Inventions are unrelated if it can be shown that they are not disclosed as capable of use together and they have different modes of

Art Unit: 1616

operation, different functions, or different effects (MPEP § 806.04, MPEP § 808.01). In the instant case the different inventions have different functions. The composition of Group III does not require the organic non-vegetable non-fuel high boiling oil of Group I.

Inventions I and IV are unrelated. Inventions are unrelated if it can be shown that they are not disclosed as capable of use together and they have different modes of operation, different functions, or different effects (MPEP § 806.04, MPEP § 808.01). In the instant case the different inventions have different modes of operation and functions. The method of Group IV does not require the composition of Group I.

Inventions II and III are unrelated. Inventions are unrelated if it can be shown that they are not disclosed as capable of use together and they have different modes of operation, different functions, or different effects (MPEP § 806.04, MPEP § 808.01). In the instant case the different inventions different modes of operation and functions. The method of Group II requires an oil not found in Group III composition.

Inventions II and IV are unrelated. Inventions are unrelated if it can be shown that they are not disclosed as capable of use together and they have different modes of operation, different functions, or different effects (MPEP § 806.04, MPEP § 808.01). In the instant case the different inventions different modes of operation. The method of Group II requires a different composition than the method of Group IV.

Inventions III and IV are related as product and process of use. The inventions can be shown to be distinct if either or both of the following can be shown: (1) the process for using the product as claimed can be practiced with another materially different product or (2) the product as claimed can be used in a materially different

Art Unit: 1616

process of using that product (MPEP § 806.05(h)). In the instant case the composition of Group III can be used as a fertilizer.

Because these inventions are distinct for the reasons given above and have acquired a separate status in the art as shown by their different classification and would present a burden of search on the Examiner, restriction for examination purposes as indicated is proper.

Applicant is reminded that upon the cancellation of claims to a non-elected invention, the inventorship must be amended in compliance with 37 CFR 1.48(b) if one or more of the currently named inventors is no longer an inventor of at least one claim remaining in the application. Any amendment of inventorship must be accompanied by a request under 37 CFR 1.48(b) and by the fee required under 37 CFR 1.17(i).

The examiner has required restriction between product and process claims. Where applicant elects claims directed to the product, and a product claim is subsequently found allowable, withdrawn process claims that depend from or otherwise include all the limitations of the allowable product claim will be rejoined in accordance with the provisions of MPEP § 821.04. **Process claims that depend from or otherwise include all the limitations of the patentable product** will be entered as a matter of right if the amendment is presented prior to final rejection or allowance, whichever is earlier. Amendments submitted after final rejection are governed by 37 CFR 1.116; amendments submitted after allowance are governed by 37 CFR 1.312.

In the event of rejoinder, the requirement for restriction between the product claims and the rejoined process claims will be withdrawn, and the rejoined process claims will be fully examined for patentability in accordance with 37 CFR 1.104. Thus, to be allowable, the rejoined claims must meet all criteria for patentability including the requirements of 35 U.S.C. 101, 102, 103, and 112. Until an elected product claim is found allowable, an otherwise proper restriction requirement between product claims and process claims may be maintained. Withdrawn process claims that are not commensurate in scope with an allowed product claim will not be rejoined. See "Guidance on Treatment of Product and Process Claims in light of *In re Ochiai*, *In re Brouwer* and 35 U.S.C. § 103(b)," 1184 O.G. 86 (March 26, 1996). Additionally, in order to retain the right to rejoinder in accordance with the above policy, Applicant is advised that the process claims should be amended during prosecution either to maintain dependency on the product claims or to otherwise include the limitations of the product

Art Unit: 1616

claims. **Failure to do so may result in a loss of the right to rejoinder.** Further, note that the prohibition against double patenting rejections of 35 U.S.C. 121 does not apply where the restriction requirement is withdrawn by the examiner before the patent issues. See MPEP § 804.01.

During a telephone conversation with Melanie Brown on 01/20/06 a provisional election was made with traverse to prosecute the invention of Group I, claims 1-11.

Affirmation of this election must be made by applicant in replying to this Office action.

Claims 12-43 are withdrawn from further consideration by the examiner, 37

CFR 1.142(b), as being drawn to a non-elected invention.

Accordingly, claims 1-11 are presented for examination on the merits.

### ***Claim Rejections - 35 USC § 102***

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

Claims 1, 4 and 11 are rejected under 35 U.S.C. 102(b) as being anticipated by Woods (US 2,957,803).

Instant claim 1 is drawn to a composition comprising a particulate material; an organic non-vegetable non-fuel high boiling oil; and at least one additive selected from the group consisting of ionic salt, colored particle, or surfactant.

Woods discloses a dichloro diphenyl trichloroethane (DDT) composition comprising DDT particles, lard, emulsifier, urea and water (Column 3, example 2). It is the Examiner's position that an emulsifier can be a surfactant.

Instant claim 11 recites "a bloom thinning emulsion" comprising said composition of claim 1 and additionally comprising water. It is the Examiner's position that the composition of Woods could be used for a bloom thinning emulsion.

### ***Claim Rejections - 35 USC § 102***

Claims 1, 2, 4, 6 and 10 are rejected under 35 U.S.C. 102(b) as being anticipated by Jackson et al. (US 2,821,500).

Jackson et al. disclose a granular insecticide coated with oil and an oil-dispersible organic toxicant for the insect (Column 2, lines 25-31). Jackson et al. disclose an example of a composition comprising malathion, scarlet dye, gelatin, mineral oil, sucrose and oyster shell thus anticipating instant claim 1 and 10 (Column 12, lines 20-26). Gelatin can act as a surfactant/dispersant. Oyster shell is a form of calcium carbonate and thus reads on instant claim 2. Mineral oil is a petroleum based oil and thus reads on instant claim 4.

A dye of any color can be added thus anticipating pigments that selectively reflect or absorb in red, blue, or green regions (Column 2, lines 65-67 and column 6, lines 64-73). Sand, quartz and granite are other granular substances that can be used as a carrier (Column 3, lines 28-31). Any non-drying or semi-drying vegetable, animal or marine oil or mineral oil may be used but mineral or glyceride oil is preferred (Column 5,

lines 3-8). A dispersant is used to scatter the toxicant-oil solution into and throughout the moisture that comes in contact with the granules (Column 6, lines 43-55).

***Claim Rejections - 35 USC § 102***

Claims 1, 5, 10 and 11 are rejected under 35 U.S.C. 102(b) as being anticipated by Anderson et al. (US 5,783,520).

Anderson et al. disclose a sprayable herbicidal aqueous dispersion of microcapsules containing the herbicide clomazone dissolved in an inert high boiling organic solvent (Abstract and claim 1). It is the Examiner's position that microcapsules are a particulate material. A formulation is given in Example 1 where 37 parts sodium nitrate and 2.2 parts of 48.5 percent aluminum sulfate were added as densification salts to the microencapsulated feedstock (Column 6, lines 50-55). Xanthan gum thickener and a biocide were added to the densified aqueous suspension (Column 6, lines 57-59). Suitable highly boiling organic solvents include various petroleum fluids (Column 3, line 65-column 4, line 4). The suspension system composition may comprise a combination of agents, such as surfactants, dispersants, clays, water, salts and polymers (Column 4, lines 10-20 and claim 12). The dispersant system for the microencapsulation process may contain one or more non-ionic surfactant, colloid or a cationic component and the formulations may be applied without further dilution (Column 9, lines 11-16). The reference of Anderson et al. is deemed to anticipate instant claims 1, 5 and 10.



Instant claim 11 recites "a bloom thinning emulsion" comprising said composition of claim 1 and additionally comprising water. It is the Examiner's position that the composition of Anderson et al. could be used for a bloom thinning emulsion.

***Claim Rejections - 35 USC § 103***

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claims 1-4, and 6-10 are rejected under 35 U.S.C. 103(a) as being unpatentable over Jackson et al. (US 2,821,500) in view of Puterka et al. (US 6,027,740).

The reference of Jackson et al. is described in detail above and that discussion is hereby incorporated by reference.

Jackson et al. do not expressly disclose the use of calcined materials in the composition.

Jackson et al do not expressly disclose the use of hydrous kaolin in the composition.

Jackson et al. do not expressly disclose the colorants listed in instant claim 7.

Jackson et al. do not expressly disclose the use of modified phthalic glycerol alkyl resins, plant oil based materials with emulsifiers, polymeric terpenes, and nonionic detergents in the composition.

Puterka et al. teach the use of calcined kaolins, hydrous kaolins and calcium carbonates as particulate materials for the protection of surfaces, including agricultural and ornamental crop surfaces, from arthropod infestation (Abstract; column 2, lines 19-26; column 3, lines 14-45). Puterka et al. teach the use of surfactants and/or spreader/stickers that can be mixed with the particles and include modified phthalic glycerlol alkyl resins, plant oil based materials with emulsifiers, polymeric terpenes, and nonionic detergents (Column 5, lines 35-46).

It would have been obvious to one of ordinary skill in the art at the time the claimed invention was made to use calcined kaolin or hydrous kaolin, as suggested by Puterka et al. in the composition of Jackson et al. and produce the instant invention.

One of ordinary skill in the art would have been motivated to do this because Puterka et al. teach that these materials are non-toxic, which is an important consideration when working with products for human consumption (Column 4, lines 48-49).

It is the Examiner's position that it would have been obvious to one of ordinary skill in the art at the time the claimed invention was made to select colorant/pigment/dye for the composition as suggested by Jackson et al. (A dye of any color can be added (Column 2, lines 65-67 and column 6, lines 64-73). The selection of the specific colorant is well within the purview of one of ordinary skill in the art.

It would have been obvious to one of ordinary skill in the art at the time the claimed invention was made to use modified phthalic glycerlol alkyl resins, plant oil based materials with emulsifiers, polymeric terpenes, and nonionic detergents in the

composition, as suggested by Puterka et al. in the composition of Jackson et al. and produce the instant invention.

One of ordinary skill in the art would have been motivated to do this because Puterka et al. teach that these materials aid in spraying uniform treatments on the surfaced to be treated (Column 5, lines 39-40).

From the teachings of the references, it is apparent that one of ordinary skill in the art would have had a reasonable expectation of success in producing the claimed invention. Therefore, the claimed invention, as a whole, would have been prima facie obvious to one of ordinary skill in the art at the time the invention was made, because every element of the invention and the claimed invention as a whole have been fairly disclosed or suggested by the combined teachings of the cited references.

### ***Conclusion***

The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

No claims are allowed.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Ernst V. Arnold whose telephone number is 571-272-8509. The examiner can normally be reached on M-F.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Sreeni Padmanabhan can be reached on 571-272-0629. The fax phone

Art Unit: 1616

number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

EVA

  
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